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ABSTRACT

Skillful interpretation of nonverbal communication on the part of college administrators is pointed out as an important factor in the success or failure of educational enterprises. A method is presented of using such instruments as the Occupational Climate Description Questionnaire and the Leadership Behavior Description Questionnaire in assessing and improving the sensitivity of administrators to the impact of their personal behavior systems upon curricular quality. It is emphasized that the task of the administrator is to arrange the organizational conditions and methods of operation so that faculty members can best achieve their own goals by also furthering the jointly defined goals of the university. (JD)

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by

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Abstract

of

Clever Hans, Non-Verbal Literacy
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Hans was the horse of a German mathematician named Von Osten during the latter part of the last century. By way of tapping his hoof Hans was able to add, subtract, multiply, divide, read, spell, and solve innumerable complex problems.

The well-documented study of Hans[1] as it relates to the literatures of experimenter bias, non-verbal communication, and cueing, emphasizes the importance of fostering a new kind of literacy among university administrators; i.e., cue or non-verbal literacy.

The importance of non-verbal communication in its contribution to the success or failure of educational enterprise cannot be overstated. This paper presents a method of utilizing such instruments as the Occupational Climate Description Questionnaire (OCDQ), the Leadership Behavior Description Questionnaire (LBDQ), National Training Laboratory literature, etc., toward assessing and improving instructional effectiveness.

The purpose of this paper is to increase the sensitivity of university administrators vis-a-vis the impact of their personal behavior systems upon curricular quality.

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[1] Pfungst, O., Clever Hans: A Contribution to Experimental, Animal, and Human Psychology. New York: Holt, 1911 and 1965, as cited in Rosenthal, Robert, "Teacher Expectation and Pupil Learning", in Strom, R. (Ed.), Teachers and The Learning Process. Englewood Cliffs, New Jersey, 1971, pp. 33-60.

CLEVER HANS, NON-VERBAL LITERACY and the IMPROVEMENT OF INSTRUCTION

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Clever Hans was the horse of a German mathematics teacher named Mr. von Osten during the latter part of the last century. By way of tapping his hoof Hans was able to add, subtract, multiply, divide, read, spell, and solve innumerable complex problems.

At first it was assumed that Mr. von Osten was perpetrating a fraud by somehow cueing Hans. Von Osten, however, dispelled suspicion when he allowed other people to question Hans privately.

Hans' fame grew until it came to the attention of two German researchers named Pfungst and Stumpf who undertook a program of research to try to determine the basis of the horse's secret.

It was soon found that Hans could not answer questions if he could not see his questioner. It was also found that if the questioner did not know the answer to his own question, Hans could not answer it either.

On these bases Pfungst determined that in some way the questioners were unwittingly signaling to Hans when to start and stop tapping his hoof.

After extended observation, Pfungst determined that a forward movement of a questioner's head was sufficient to start Hans tapping and as the questioner straightened up Hans would stop. Pfungst also found that very slight movements of his head, merely raising an eyebrow or dilating a nostril, would stop Hans' tapping. Consequently, the more forward a questioner bent the faster Hans would tap, and, as the questioner gradually straightened Hans' tapping would slow down until the questioner would relax, at which time Hans would stop at the correct answer.

Hans was clever indeed! Clever enough to "read" people. Clever enough to decode non-verbal messages so subtly that he amazed and mystified people for years.

The well-documented study of Hans (Pfungst, 1911) serves to identify the role of experimenter bias and non-verbal perception as factors which might affect the improvement of instruction.

The importance of non-verbal communication cannot be overstated in its contribution to the success or failure of educational enterprise.

The success of an educational institution rests primarily upon a threefold perception complex. First, the administrator must be a sensitive receiver of impressions regarding factors which affect the performance continuum. In order to sharpen his abilities in this regard, he might begin by concentrating upon developing his listening skills. For, as Kelly (1970) states;

> "Listening by its very nature has to be emphathetic; a person understands what he has heard only to the extent that he can share in the meaning, spirit, or feeling of what the communicator has said."

Secondly, a faculty member must be able to infer feelings of trust, personal responsibility, potential success, and appreciation which should be fostered by the administrative hierarchy. Rokeach (1960, p. 391-393) suggests that research in belief-system congruence might help administrators understand their probability of success when attempting to promulgate these feelings;

> "We generally seem to prefer. . . those with belief systems that are congruent with our own.". . . Findings suggest that this organizing principal is far more important than other kinds of categorizations, such as race or ethnic grouping, in determining our relations with others."

Third, each member of the administrative staff must have, or must be progressing toward, a realistic self-awareness of his own personal attributes which might affect the attainment of institutional goals. The levels of open-mindedness of staff members are directly proportional to their levels of self-awareness. Heightened open-mindedness and self-awareness in turn influence the quality of interpersonal relationships through increased receptivity to new ideas, and to other people in general. Rokeach (1960, p. 396) reinforces this notion by stating;

> "The capacity to distinguish information from source of information and to evaluate each on its own merits. . . describes the essence of the open and closed mind." . . . "These considerations. . . have led us to see (that) acceptance and rejection of authority, of people, and of ideas have a common structural basis and also a common functional basis. . ."

Consider, if you will, the classical communication model in which a sender encodes a message which is decoded by a receiver. The receiver, in turn, encodes feedback relative to the original message which is then decoded by the sender, thus completing a communication cycle.

The successful administrator should be perceptive enough, in his relationships with faculty and fellow staff members, to be able to "read" people to the extent that both verbal and non-verbal messages are encoded and decoded with minimal distortion. On the other hand, he should also be perceptive enough to decode feedback, again both verbal and non-verbal, for purposes of modification, restatement, or repetition in order for his original messages to complete their tasks. Many intervening variables may affect the qualitativeness of a communique, however, as stated by Millar and Millar (1976, p. 42);

> ". . . probably the single greatest deterrent to understanding another (to accurately perceiving his subjective reality) is the difference between us--our own internal frame of reference, our own idiosyncratic, subjective, symbolic reality."

The question which arises is: How can a university administrator utilize the cues and signals that people transmit toward improving instructional effectiveness? But even more important and basic is the question: How can he perceive such cues and signals; what should he look for?

Various researchers have concluded that the following kinds of non-verbal cues are significant in affecting the quality of interaction between people (Millar and Millar, pp. 78-94). They can be easily applied to institutions of higher learning by confronting the following concomitant questions:

1. Environment: How is the physical arrangement of the environment determined? What are the determinants? Parameters? Are physical arrangements determined by administrative forethought or by historic accretion? Does the individual have the autonomy to control his own environment?
2. Space: Are we aware of the way we utilize our immediate life-space? (see Hall, 1959 and 1969) Are our work areas or offices designed to be people-oriented or problem-oriented? Do furniture arrangements impede or promote openness?
3. Physical Appearance: Although most are reluctant to admit this, physical attractiveness is an important variable in interpersonal attraction. Are we equitable in our dealings with all people in this regard? Is our judgement impaired by a predeliction toward physical attractiveness?
4. Dress: Mode and manner of dress have been shown to have particular effect when making judgements about strangers. Do we allow first impressions and initial judgements to endure to the point of influencing future interactions?

5. Body Movements: Gestures have been said to serve as substitutes for language, indicators of emotional intensity and general mood, and punctuation marks for conversation. Do our body movements enhance the probability of facilitating communication? Do we allow ourselves to be easily "read"?
6. Body Rhythms: Recent research suggests that there is a relationship between our biorhythms and our interpersonal behaviors. Are we open-minded enough to acknowledge this possibility and to pursue further information to determine how our biological fluctuations influence our behavior patterns?
7. Face and Eyes: The importance of facial signals in decoding feedback and establishing a mood is often underestimated. Albert Mehrabian (1971) states that seven percent of a message is verbal; 38 percent of a message is vocal; and that 55 percent of a message is facial!
8. Touch: Touch can serve as a regulator of interaction and can be used to establish intimacy and trust. It should be noted (as in Hall, 1959) that cultural variables influence the effectiveness of this cue.

Along with the questions: "What do I see, feel, and hear", one must ask himself: "Am I seeing, feeling, and hearing what I want to perceive or am I aware of the actual meaning of messages that are being transmitted?"

Once the signals have been correctly translated then comes the task of utilizing them in further communications toward achieving the institution's goals; i.e. delivering efficient and effective instruction.

Carl Rogers, (1969, see Chapter 10) states that the educational administration is responsible for arranging and organizing the resources of the institution --the faculty, the students, the funds, the equipment and materials, in such a way that all the persons involved can work together toward defining and achieving their own educational goals.

The task of the administrator is to arrange the organizational conditions and methods of operation so that people can best achieve their own goals by also furthering the jointly defined goals of the institution. Rokeach (1960, p. 395) on the same subject, but from the perspective of his research in the area of belief congruence provides a more quantitative basis for his statements:

> "The principle of belief congruence governing the organization of belief systems helps us to organize not only the world of people, but also the world of ideas and authority in relation to each other." . . . ". . . we organize the world of ideas, people, and authority basically along lines of belief congruence. What is not congruent is further organized

in terms of similarity to what is congruent." Much of our behavior. . . seems. . . to be determined by such cognitive organizations."

Another facet of the administrator's function, as Rogers states further, should be to serve as a catalyst in releasing the capacity of others toward the goal of bringing facilitative leaders into being at the administrative, faculty, and student levels; individuals who can listen, understand, accept, clarify and communicate; individuals who can help either an individual or a group to experience more clearly its own current and changing aims, difficulties, desires, frustrations, antagonisms, so that he or they can be more effectively self-directing.

To begin with, an administrator might try to define the existing climate within his institution. He might employ the Organizational Climate Description Questionnaire (OCDQ) which was created by Andrew W. Halpin (1957). The OCDQ technique has been used widely by researchers who wish to determine whether certain types of organizational climates are found in institutions with administrators having certain characteristics.

For example, if an administrator is cold, distant, and "goes by the book" what kind of "personality" can we expect his program to have? On the other hand, if he is "people oriented" and more concerned with the personal dimension of his organization will the climate of his institution reflect his concerns? This rhetorical question states, perhaps too simply, the preoccupation we administrators seem to have with the personal dimension while perhaps neglecting situational contexts as in Rokeach (1960, p. 401);

> "Have we not stressed personality too much at the expense of situational determinants of social behavior? A field-theoretical position requires a consideration of both personal and situational conditions, and their interactions, as determinants of behavior. A sole concern with personality ignores the role of the present context; a sole concern with the present context leaves us with the embarassment of individual differences."

The application of such techniques as the OCDQ can be used to nurture a more qualitative and realistic self-awareness but a problem still remains. It follows logically that the administrator who is sensitive enough to consider implementing such climate-evaluating techniques is concommitantly perceptive enough to be aware (a priori) of existing goal obstacles.

One might draw upon the much used analogy of the preacher berating his congregation for the sins of those not present, in this instance. In other words, the ones who are most needy of such evaluation techniques are the least likely

to employ them.

For the administrator who would like to determine how he is perceived by other members of the organization the Leadership Behavior Description Questionnaire (Halpin, 1957) might be employed.

> "The LBDQ contains items, each of which describes a specific way in which a leader may behave. The respondent indicates the frequency with which he perceives the leader to engage in each type of behavior by marking one of five adverbs: always, often, occasionally, seldom, never. These responses are obtained from the members of the leader's immediate workgroup, and are scored on two dimensions of leader behavior. For each dimension, the scores from the several group members are then averaged to yield an index of the leader's behavior in respect to that dimension."

Numerous studies have been undertaken which apply this (or a similar) technique to educational enterprises. An example such as J. K. Hemphill's (1955) "Patterns of Leadership Behavior Associated with Administrative Reputation of the Department of a College" might provide insights toward facilitating the instructional process when a particular institution's idiosyncrasies are viewed from this perspective.

The university administrator, therefore, needs to be aware of his own behavior system. This system of behaviors might be defined as ". . . the processes within himself and the situation in which he finds himself, which includes the attitudes and expectations of others." (NTL, p. 29).

The OCDQ and the LBDQ which can be used to assess these dimensions, can be made more effective if the administrator's skills in observing and diagnosing group behavior are highly developed.

Programs such as the National Training Laboratory Institutes utilize group process techniques to heighten intercommunication among members of groups, group objectivity toward its own functioning, the development of interdependent responsibility, group cohesion, recognition and significant sociometric factors within its own structure, etc. These programs, however, may be impractical in terms of expense to the employing institution or the time required for participation by faculty members and administrators.

What then of instructional development?

During the last two decades, various approaches have been used to ostensibly improve the teaching/learning process. Such approaches have included: changing the curriculum; recruiting "better" students; recruiting Ph.D.'s from the "best" graduate schools; reducing the faculty/student ratio; developing media and

instructional resource centers; undertaking exhaustive comprehensive self-studies, etc. In view of the profound changes in higher education and the increasing number of intervening variables which are exerting pressure upon every aspect of the collegiate environment, relying upon these past approaches will not suffice. (Bergquist et al, 1975)

While several of these approaches have resulted in serendipitous instructional improvement we must now turn our attention to research in the following areas to be applied in concert with established practices:

1. Faculty Teaching Styles: What is a "good" teacher? Is it possible that "good" teachers exist within each teaching style? Should a teacher be expected to change his teaching style as the situation warrants? Much research exists concerning the identification of teaching styles. (See Adelson; Axelrod) We should be working toward fostering faculty awareness in this area.
2. Student Learning Styles: Can learning style be linked to content area? Can the student population be considered the independent variable? Are age, maturation level, experience level, "worldliness", factors which influence attitudes toward learning? (See Grasha, 1972)
3. Instructional Evaluation: What system(s) of evaluation is (are) used to determine instructional effectiveness? Self-evaluation techniques? Peer-evaluation models? Student evaluation? Several evaluation instruments are commercially available which can be used in this regard. They include: the Council for the Advancement of Small Colleges' Instructional Assessment System (IAS); Kansas State University's Instructional Development and Effectiveness Assessment (IDEA); University of Massachusetts' Teaching Analysis by Students (TABS); Southern Illinois University's ISIS; and Educational Testing Service's Student Instructional Report (SIR); among many others. Is your faculty committed to instructional evaluation? Do they have a choice regarding which system they may adopt? Are they aware of the advantages and disadvantages of each system?
4. Organizational Development: Is faculty innovativeness hindered by organizational resistance to change? Have methods been adopted which deal with conflict management in the area of decision-making? Is there a program of managerial training which is designed to facilitate skill building in faculty and administrative domains?

These areas of concern must be investigated. For, in order to be effective the administrator must be a skilled communicator. In the face of situational pressures and time limitations he must not only concentrate on the meaning of words, but also upon the meaning of behavior. He must be able to "read into" emotional tone; he must be aware of the meaning of eye contact, hesitations, and facial expressions; he must be able to perceive relaxed, tense, or threatened behavior in his relationships with people. In short, he must excel as the human counterpart to "Clever Hans".

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